


Illicit Discharge Elimination Program (IDEP)
 Refresher Training
 As required by Part I, Section A.3.d.3 of the MS4 NPDES Permit

Stormwater Pollution Prevention



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Why Am I Taking this Training?

- If you are taking this training, you will learn
 - how to identify a potential illicit discharge or connection, and
 - The proper procedure for reporting and responding to an illicit discharge or connection
- This training is for municipal employees and contractors working for municipalities
- Training is required
 - At least once during the permit cycle (typically 5-years) for existing staff
 - New hires shall receive training within one year of their hire date

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About the Permit Program

- National Pollutant Discharge Elimination System (NPDES) permit program for Municipal Separate Storm Sewer Systems (MS4s)
- Goal of the MS4 program is to reduce the discharge of pollutant to surface waters of the State
- An MS4 is a system of drainage (including roads, storm drains, pipes, ditches, etc.) that is not a combined sewer or part of a sewage treatment plant.
- Stormwater discharges from a regulated MS4 to a surface water of the State in an urbanized area are subject to regulations under the NPDES program.
- Michigan Department of Environment, Great Lakes, and Energy (EGLE) regulates the MS4 permit.

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What an illicit discharge is

What an illicit connection is

How to prevent them

What to do when one is discovered

Where to report issues

When you complete this course, you should know

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Municipal Separate Storm Sewer System (MS4)

- A municipally owned system of drainage (including roads, storm drains, pipes, ditches, etc.) that is not a combined sewer or part of a sewage treatment plant.

Illicit Discharge

- Any discharge to, or seepage into, an MS4 that is not composed entirely of stormwater or uncontaminated groundwater.

Illicit Connection

- A physical connection to an MS4 that primarily conveys non-stormwater discharges other than uncontaminated groundwater.

Definitions

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Why We Care About Illicit Discharges

- Rainwater from storm events flows to surface water bodies
- Keeping pollution out of stormwater protects rivers and lakes



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What are Common Stormwater Pollutants?

 Litter	 Pesticides	 Oils and grease	 Sewage and grey water
 Chemicals from landscaping, pressure washing, auto repair, salvage yards, etc.	 Domestic animal waste	 Improperly disposed household chemicals	 Soil erosion

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Spotting Sources


- Dry weather flow
- Staining
- Discolored water
- Laundry smell
- Sanitary smell or debris
- Small pipes to catch basins or drains



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Dry Weather Flow

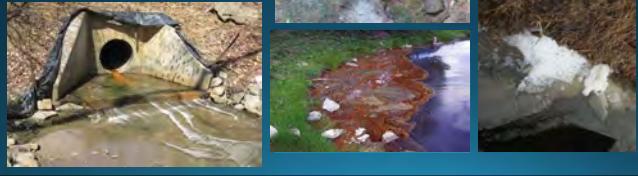
- Drainage pipes should be dry if it hasn't rained recently
 - <0.10 inches of rain in the previous 72 hours
- Exception examples
 - High groundwater
 - Irrigation
 - Footing drains



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What does an Illicit Discharge Look Like

- Staining
- Suds or Foam
- Smell



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Laundry Connections

- Suds
- Lint
- Surfactants
- Odor



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Vehicle Washing

- Residential
- Commercial
- Surfactants



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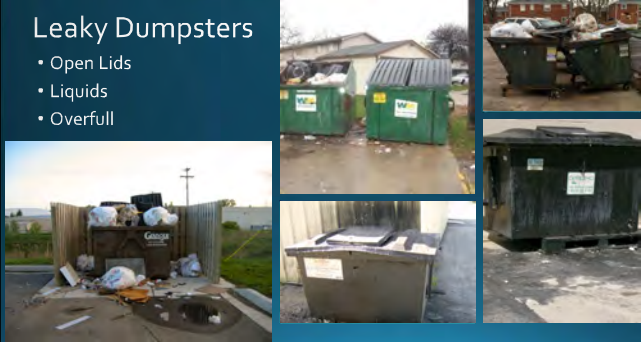
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Leaky Dumpsters

- Open Lids
- Liquids
- Overfull



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Dumping



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Construction Sites


- Sediment Runoff
- Spoil Piles
- Unprotected CB's
- Regulated under Part 31 and 91 of NREPA and implemented by GCDC Water and Waste Services



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Concrete Washout



- pH = 12, similar to Drano™
- Increase toxicity
- Contaminates soil and kills plants
- Clogs fish gills
- Wet saw cutting waste has same concerns as concrete washout
- Washout only in designated areas that are lined to contain the wastes and protect soil



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Scoop the Poop

- Not fertilizer
- Pollutes water
- Contains harmful parasites and bacteria
- Health hazard for other pets and humans

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Incidental runoff of chemicals, raw materials, yard debris ...



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Stay Alert for Common Signs

- Stains on the pavement
- Stressed or dead vegetation
- Open chemical containers haphazardly stored outside
- Discoloration in waterbodies
- Liquid ponding in an area that should be dry
- Lack of documentation for proper disposal
- Soapy or colored water flowing from culverts
- Strange odors




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Reporting potential problems?

EMERGENCIES	Agency	Phone
Spills, Releases, other Environmental Emergencies	EGLLE Pollution Emergency Alerting System (PEAS)	(800) 292-4706
Emergencies	Police/Fire	911

NON-EMERGENCIES	Agency	Phone
General Illicit Discharge Coordination	Drain Office, Surface Water Management	(810) 732-1590
Human Waste/Failing Septic Systems	Health Department, Environmental Health	(810) 257-3603
Construction Sediment	Drain Office, Water and Waste Services	(810) 732-7870



- Spills and contamination to lakes, rivers, and streams
- Suspicious dumping to catch basins or waterways
- Unusual discharges from pipes
- Sewage on the ground or draining to surface water
- Large number of dead fish in waterways
- Failing or leaky septic systems
- Polluted runoff from storage piles or dumpsters to catch basins or waterways
- Sewage, detergent, chemical, petroleum or rotten egg odors
- Soil erosion from construction sites

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Questions?

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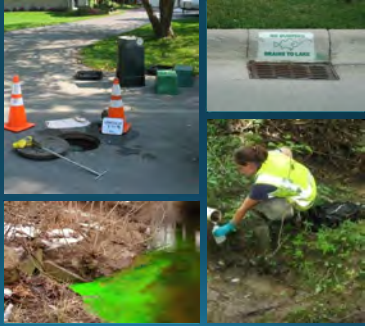
Follow Up

Investigations

- Field Tests
- Lab Tests
- Upstream Tracking
- Dye Testing

Corrective Actions

- Property owner responsibility



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Additional Information

- [GCDC Surface Water Management \(gcdcswm.com\)](http://gcdcswm.com)
- www.ClearGeneseeWater.org
- [EGLE - Municipal Program / MS4 Compliance Assistance \(michigan.gov\)](http://michigan.gov)
- YouTube
 - [How to Spot and Report Stormwater Pollution – YouTube \(7-minute video\)](#)
 - [Storm Drain - Illicit Discharge Detection & Elimination, a grate concern \(5 min\) – YouTube \(5-minute video\)](#)
 - [NPDES Refresher Training: Illicit Discharge Detection & Elimination – YouTube \(18-minute video\)](#)

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Thank you

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